

B1
Sub B2
DNA construct to a hormone selected from the group consisting of lactogenic hormones, somatogenic hormones and mixtures thereof [lactogenic stimuli].

2. (Twice Amended) The method according to claim 1, [the method comprising said] wherein the enhancer element is the SPI-growth hormone responsive element (SPI-GHRE) [or a derivative thereof].

In claim 5, line 4, please replace "TTC TGA GAA" with --TTCTGAGAA-- .

B2
6. (Twice Amended) ~~The enhancer element of claim 5, wherein the enhancer element is responsive to both lactogenic hormones and somatogenic hormones [somatic and lactogenic stimuli].~~

7. (Twice Amended) ~~The enhancer element of claim 5, wherein the enhancer element is responsive to signals generated from both growth hormone and prolactin [prolactine] receptors.~~

D
B3
9. (Twice Amended) An expression vector according to claim 8, wherein the promoter is a ^{thymidine} ~~thiamine~~ kinase promoter [comprising a structural gene encoding a desired protein and a mammary tissue specific promoter, wherein the vector further comprises at least one enhancer element including the nucleotide sequence TTC TGA GAA].

B4
Sub B5
10. (Twice Amended) The expression vector according to claim 9, wherein said enhancer element comprises [a single or multimeric copies] at least one copy of the SPI-growth hormone responsive element (SPI-GHRE) [or a derivative thereof].

11. (Twice Amended) [A] An isolated eukaryotic host cell containing the expression vector according to claim 8.

B5
15. (Amended) The enhancer element of claim ⁵/₂ wherein the enhancer element is responsive to signals generated from both growth hormone and prolactin [prolactine] receptors.

16. (Amended) [A] An isolated eukaryotic host cell containing the expression vector according to claim 9.

17. (Amended) [A] An isolated eukaryotic host cell containing the expression vector according to claim 10.

Please add the following claims:

~~Sub D5
Sub E10~~
--19. A method of enhancing the transcription of a gene in a DNA construct comprising a structural gene and a promoter upstream of the structural gene, the method comprising providing upstream of the promoter at least one enhancer element consisting essentially of the nucleotide sequence TTCTGAGAA, and exposing the DNA construct to a hormone selected from the group consisting of lactogenic hormones, somatogenic hormones and mixtures thereof. --

--20. A method according to claim 19, wherein the hormone is selected from the group consisting of growth hormone, prolactin, placenta lactogen and mixtures thereof.--

~~B5~~
--21. A method according to claim 20, wherein the hormone is selected from the group consisting of prolactin, placenta lactogen and mixtures thereof.--

--22. A method according to claim 20, wherein the [one] enhancer element consists of the nucleotide sequence TTCTGAGAA.-- ~~E~~

~~Sub D6
Sub E11~~
--23. ~~An enhancer element responsive to a hormone selected from the group consisting of lactogenic hormones, somatogenic hormones and mixtures thereof when the enhancer element is used in a DNA construct for transfection of a eukaryotic host cell; wherein the enhancer element comprises the nucleotide sequence TTCTGAGAA, with the proviso that the nucleotide sequence is other than the nucleotide sequence of the SPI-GHRE --~~

--24. An enhancer element according to claim 23, wherein the hormone is selected from the group consisting of growth hormone, prolactin, placenta lactogen and mixtures thereof.--

8h
C1
--25. An enhancer element according to claim 24, wherein the hormone is selected from the group consisting of prolactin, placenta lactogen and mixtures thereof, and wherein the enhancer element comprises the nucleotide sequence TTCTGAGAA, with the proviso that the nucleotide sequence is other than the nucleotide sequence:

GATCTACGCTTCTACTAATCCATGTTCTGAGAAATCATCCAGTCTGCCCCATG.--

Sub D9
--26. ~~An enhancer element according to claim 25, wherein the enhancer element consists essentially of the nucleotide sequence TTCTGAGAA.--~~

8h
C2
--27. An expression vector comprising a structural gene encoding a structural protein, a promoter, and at least one enhancer element comprising the nucleotide sequence TTCTGAGAA, with the proviso that the nucleotide sequence is other than the nucleotide sequence GATCTACGCTTCTACTAATCCATGTTCTGAGAAATCATCCAGTCTGCCCCATG.--

Sub B 10
--28. An expression vector according to claim 27, wherein the enhancer element is responsive to a hormone selected from the group consisting of growth hormone, prolactin, placenta lactogen and mixtures thereof.--

Sub D 11
--29. ~~An expression vector according to claim 27, wherein the enhancer element consists essentially of the nucleotide sequence TTCTGAGAA, and further wherein the enhancer element is responsive to a hormone selected from the group consisting of prolactin, placenta lactogen and mixtures thereof.--~~

8h
C3
--30. A DNA comprising a promoter, a structural gene, and at least one enhancer element comprising the nucleotide sequence TTCTGAGAA, with the proviso that the nucleotide sequence is other than the nucleotide sequence GATCTACGCTTCTACTAATCCATGTTCTGAGAAATCATCCAGTCTGCCCCATG.--

Sub B 12
--31. A DNA according to claim 30, comprising from one to six enhancer elements, wherein each enhancer element consists essentially of the nucleotide sequence TTCTGAGAA.--

Sub 12 --32. A DNA according to claim 30, wherein each enhancer element consists essentially of the nucleotide sequence TTCTGAGAA.--

--33. A DNA according to claim 32, wherein each enhancer element consists of the nucleotide sequence TTCTGAGAA.--

34
57
B --34. A method of enhancing the transcription of a gene in a DNA construct comprising a structural gene and a promoter upstream of the structural gene, the method comprising providing upstream of the promoter at least one enhancer element, and exposing the DNA construct to a hormone selected from the group consisting of lactogenic hormones, somatogenic hormones and mixtures thereof; wherein the enhancer element comprises the nucleotide sequence TTCTGAGAA, with the proviso that the nucleotide sequence is other than the nucleotide sequence

GATCTACGCTTCTACTAATCCATGTTCTGAGAAATCATCCAGTCTGCCCATG.---

--35. A method according to claim 34, wherein the hormone is selected from the group consisting of growth hormone, prolactin, placenta lactogen and mixtures thereof.--

--36. A method according to claim 35, wherein the hormone is selected from the group consisting of prolactin, placenta lactogen and mixtures thereof.--

--37. A method according to claim 34, wherein the method is an in vitro method.--

--38. A method according to claim 19, wherein the method is an in vitro method.--

REMARKS

The Official Action dated February 25, 1999 has been carefully considered. Accordingly, the changes presented herewith, taken with the following remarks, are believed to be sufficient to place the present application in condition for allowance. Reconsideration is respectfully requested.